

REMARKS

Claims 1-3, 6-14 and 16-19 are currently pending in the application. Claims 1, 16, 18, and 19 are in independent form.

Applicants express their gratitude for courtesies extended by the Examiner during a telephonic interview with Applicants' representative Amy E. Rinaldo conducted September 20, 2005.

Claim 7 stands rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter, which Applicants regard as the invention. In order to further prosecution, claim 7 has been amended to recited that the jacket can be formed of a polymeric fluorocarbon and to change the dependency of claim 7. Reconsideration of the rejection is respectfully requested. The rejection is respectfully requested.

Claims 1, 2, 6-8, 16, 17, and 19 stand rejected under 35 U.S.C. § 102(e) as being anticipated by the Ozawa patent. Reconsideration of the rejection under 35 U.S.C. § 102(e), as anticipated by the Ozawa patent, as applied to the claims is respectfully requested. Anticipation has always been held to require absolute identity in structure between the claimed structure and a structure disclosed in a single reference.

Anticipation "requires that all the elements and limitations of the claim be found within a single prior art reference ... There must be no difference between the claimed invention and the reference disclosed, as viewed by a person of ordinary skill in the field of the invention. *Scripps Clinic & Research Foundation v. Genentech, Inc.*, 927 F.2d 1565, 18 U.S.P.Q.2d 1001, 18 U.S.P.Q.2d 1896 (Fed. Cir. 1991). Disclosures in a prior art reference must be evaluated for what

they "fairly teach to one of ordinary skill in the art." *W.L. Gore & Associates, Inc. v. International Medical Prosthetics*, 16 U.S.P.Q. 2d 1241 (D. Ariz 1990).

If it is necessary to reach beyond the boundaries of a single reference to provide a missing disclosure of the claimed invention, it is not a § 102 anticipation. Scripps Clinic & Research FDN. v. Genentech Inc., 927 F.2d 1565, 18 USPQ2d 1869 (Fed. Cir. 1991). Furthermore, anticipation is not shown even if the differences between the claims and the prior art reference are argued to be "insubstantial" and the missing elements could be supplied by the knowledge of one skilled in the art. Structural Rubber Prod. Co. v. Park Rubber Co., 221 USPQ 1264 (Fed. Cir. 1984). Moreover, in Jamesbury Corp. v. Litton Industrial Products, Inc., 225 USPQ 253 (Fed. Cir. 1985), the Court stated that the assertion of invalidity for lack of novelty, if the prior art disclosed "substantially the same thing", is erroneous. The prior art must meet each claim limitation in order to constitute an anticipation under § 102.

The Office Action has held that the Ozawa patent discloses a hose assembly comprising an inner layer of a polymeric material where the material is heat resistant and inherently would be chemically resistant. It is respectfully submitted that the Ozawa patent discloses an inner layer formed of vulcanized rubber. It is respectfully submitted that the presently pending independent claims have been amended to recite that the inner layer is formed of a polymeric fluorocarbon. There is no suggestion or teaching in the Ozawa patent for forming a hose assembly with an inner liner formed of a polymeric fluorocarbon and as such the presently pending independent claims are patentable over the Ozawa patent and reconsideration of the rejection is respectfully requested.

Claim 18 stands rejected under 35 U.S.C. §103(a) as being unpatentable over the Ozawa patent. In order to further prosecution, claim 18 has been canceled without prejudice thereby rendering the presently rejection moot. Reconsideration of the rejection is respectfully requested.

Claims 1, 2, 5-9, 13, 14, 16-19 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over the Powel patent in view of the Kutnyak patent. Reconsideration of the rejection under 35 U.S.C. § 102(e), as anticipated by the Ozawa patent, as applied to the claims is respectfully requested. Anticipation has always been held to require absolute identity in structure between the claimed structure and a structure disclosed in a single reference.

Applicants respectfully submit that the cited reference, alone or in combination, does not render the claimed methods obvious under 35 U.S.C. § 103(a). The test for obviousness under 35 U.S.C. § 103 requires that the prior art both **suggest** the invention **and** provide one of ordinary skill in the art with **a reasonable expectation of success** in carrying out the claimed invention. In re Dow Chemical Co., 5 USPQ2d 1529 (Fed. Cir. 1988). In addition, as repeatedly stated by the Courts, any obviousness determination under § 103 must include an evaluation of the prior art in relation to **the claimed invention**. Hybritech Inc. v. Monoclonal Antibodies, Inc., 231 USPQ 81, 90 (Fed. Cir. 1986).

The law is clear that, in determining obviousness, the disclosures of prior art references must be viewed **in their entireties** for all that they teach including **"disclosures that may diverge from or teach away from the invention at hand."** W.L. Gore & Associates, Inc. v. Garlock, Inc., 220 USPQ 311 (Fed. Cir. 1983).

Furthermore, inherency is not a valid basis for a determination of obviousness under § 103: "the inherency of an advantage and its obviousness are entirely different questions; [t]hat which may be inherent is not necessarily known. Obviousness cannot be predicated on what is unknown." In re Shetty, 195 USPQ 753, 757 (CCPA 1977)(emphasis added). This law has been reiterated in numerous recent cases including In re Rijckaert, 9 F.3d 1531, 1534 (Fed. Cir. 1993):

“Obviousness cannot be predicated on what is unknown [citations omitted]. Such a retrospective view of inherency is not a substitute for some teaching or suggestion supporting an obviousness rejection.”

See also, Kloster Speedsteel AB v Crucible Inc., 230 USPQ 81, 88 (Fed. Cir. 1986).

The Office Action has held that the Powell patent discloses a hose assembly and method of forming it comprising an inner layer of PTFE, a known fluorocarbon material, and other materials, a reinforcement layer made up of different fibers including aramide fibers, where the outer layer, which can be made up of polyamides, can be extruded over and then embedded in the reinforcement layer. It is respectfully submitted that the Powell patent as shown in both the figures and the description of the Powell patent, preferably includes a multiple layer construction. The core tube 14 is preferably formed of at least two layers 20, 22 as shown in Figure 2. It is disclosed in the specification that the outermost layer 22 is formed of a material, which is compatible with or otherwise bondable directly to the innermost layer 20. Alternatively, the two layers can be bonded by means of a tie layer. There is disclosed that the core layers 20 and 22 can be fabricated by extrusion and cross-linked, chemically fused, or bonded together if they are formed of compatible materials. If the layers are formed of chemically dissimilar or otherwise incompatible materials, an adhesion layer or tie layer is used to bond the two together. In other words, the Powell patent recognizes that chemically dissimilar layers must be bonded together using a tie layer.

Further, a reinforcement layer 30 is affixed to the exterior surface of the core layer. The reinforcement layers 30 are oppositely wound in pairs so as to counter-balance torsional twisting effects. It is absolutely imperative that the reinforcement layers be affixed in pair because otherwise there would be torquing of the hose assembly. This is specifically detailed throughout the specification and there is no indication in the specification that the hose assembly can be formed

without these pairs of reinforcement layers. The patent discloses that to better control the elongation and contraction of the hose 10 and for improved impulse fatigue life, the innermost reinforcement layer 38 may be bonded, by means of fusion, mechanical, chemical or adhesive bonding, or a combination thereof, to the outer circumferential outer surface 18 of the core tube 14. As stated previously, the only manner in which the bond can be formed by means of fusion, mechanical, or chemical bonding is if the two materials are compatible. If the two materials are not compatible there is a requirement that a tie layer be used to affix in compatible layers. The patent further discloses that:

“in accordance with the precepts of the present invention, the radial penetration or other “wetting” of the individual filaments of the fibers forming the reinforcement layers 30 by the applied liquid form of a bonding agent, which may be an adhesive, resin, plasticizer, tackifier, solvent, or the like, is minimized or otherwise controlled such that substantially only the surface filaments or other portion of filaments of those fibers are contacted by the binding agent. In this way, the remainder of the filaments are not bound and thereby remain free to elongate or otherwise flex in affording optimum and consistent stress distribution.”

This indicates that only the surface filaments of the reinforcement layer are affixed to the core tube or jacket. This is further established by Figures 3A and 3B wherein the specification discloses that only the circumferential outer and inner surfaces, referenced respectively at 76 and 78, defined by a corresponding inner and outer course of filaments of the fibers forming the reinforcement layers 30A and 30B, which are wetted and bonded by the adhesive layer 60. In contrast, as may be seen with reference to a comparative view of the prior reference at 80 in Figure 3B, the adhesive layer 82 saturates the individual filaments and results in a heavier and less flexible hose. As shown in Figure 3A, only the surface portion of the reinforcing layer is wetted by the adhesive. In Figure 3B, there is shown that the entire layer is immersed within an adhesive. This complete saturation of the individual filaments is used to bond the filaments to the outer surface of the hose. In contradistinction, the presently pending independent claims recite a hose

assembly that does not use a tie layer to bind the braid to the inner layer. Instead a jacket is extruded over the braided layer. The jacket is extruded such that the braid is affixed both to the outer jacket and through the braided layer to the inner layer such that the braid is embedded within the entire assembly. There is no teaching or suggestion for this in the Powell reference.

The Kutnyak patent, according to the Office Action, discloses that it is old and known in the art to use an adhesive to adhere a reinforcement layer to an inner layer. However, as stated above, an adhesive is not used to adhere reinforcement layer to the inner layer in the presently pending independent claims. Since the claims include closed language, the use of an adhesive is specifically excluded. Since neither the Powell patent nor the Kutnyak patent either alone or in combination disclose the hose assembly and method of making the hose assembly of the presently pending independent claims, the claims are patentable over the cited prior art and reconsideration of the rejection is respectfully requested.

Claims 1-3, 5-7, 12-14, 16, 17, and 19 stand rejected under 35 U.S.C. § 103(a) as being over the King patent in view of the Horn patent. Reconsideration of the rejection under 35 U.S.C. §103(a) over the King patent in view of the Horn patent, as applied to the claims, is respectfully requested.

The Office Action has held that the King patent discloses a hose assembly comprising a tubular first layer made of a polymeric material resistant to chemical and heat degradation, a jacket layer disposed about the inner layer, and at least one aramid fiber braided layer disposed between the inner and jacket layers. The Office action acknowledges that the layer 14 is described as a coating that coats the yarn and concludes that therefore this layer can be considered to be a jacket. However, the specification of the patent discloses that the patent discloses that the coating 14 is located on the outer periphery of the braided layer 13 radially inwardly toward the inner layer 12. The coating therefore does not

extend radially outwardly from the outer periphery of the braided layer. (See specification, column 4, lines 39-63.) The coating is merely designed to provide some scratch resistance on the fibers. There is no disclosure for the jacket of the presently pending independent claims. Further, the claims have been amended to recite that the jacket extends over/beyond the braided layer. The King patent specifically states that the coating does not extend beyond the braided layer and instead teaches that the coating is designed to disperse through the braided layer. While the jacket means of the presently pending independent claims does disperse through the braided layer it also extends over the braided layer and is thus distinct from the coating of the King patent. There is no disclosure for such a jacket in the King patent.

The Office Action has included the Horne patent for disclosing that an outer layer can be extruded over and embedded in a reinforcement layer. However, the Horne patent does not disclose using an aramid-like braided layer for the reinforcing layer. The benefit of the aramid-like layer is that it is capable of passing volumetric tests and whip tests better than a standard braided layer. Therefore, the Horne patent does not disclose or suggest the hose assembly of the presently pending claims.

The Office Action also concludes that it would be obvious to modify the outer layer of the King patent using an extrusion process to place the layer on the outside of the reinforcement layer and then embed it into the reinforcement layer as suggested by the Horne patent. However, as stated above, neither the King patent nor the Horne patent discloses or suggests the use of the reinforcing layer or the jacket that extends beyond the braided layer as set forth in the presently pending claims. Accordingly, the claims are patentable over the prior art and reconsideration of the rejection is respectfully requested.

Claim 18 stands rejected under 35 U.S.C. § 103(a) as being unpatentable over the King patent in view of the Horne and Kutnyak patents. Claim 18 has been

canceled without prejudice and thereby rendering the present rejection moot. Reconsideration of the rejection is respectfully requested.

Claims 1-3, 5-9, 12-14, and 16-19 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over the King patent in view of the Powell patent. Reconsideration of the rejection is respectfully requested.

As stated previously stated, neither the King patent nor the Powell patent, either alone or in combination, disclose the claimed invention. Further, as the Powell patent discloses that the coating, for affixing the braided layers/reinforcement layers to one another and to the core layer or the outer jacket, should not extend past the periphery of the surface fibers. This teaches away from combining the Powell patent with any references that disclose dispersing a layer of material through the reinforcement layer. Therefore, there is a specific teaching in the Powell reference that teaches away from combining the Powell reference with a reference that discloses dispersing a material through the braided layer. In light of such a teaching away, it is respectfully submitted that it is improper to combine the Powell patent and the King patent and reconsideration of the rejection is respectfully requested.

The remaining dependent claims not specifically discussed herein are ultimately dependent upon the independent claims. References as applied against these dependent claims do not make up for the deficiencies of those references as discussed above. The prior art references do not disclose the characterizing features of the independent claims discussed above. Hence, it is respectfully submitted that all of the pending claims are patentable over the prior art.

In view of the present amendment and foregoing remarks, reconsideration of the rejections and advancement of the case to issue are respectfully requested.

The Commissioner is authorized to charge any fee or credit any overpayment in connection with this communication to our Deposit Account No. 11-1449.

Respectfully submitted,

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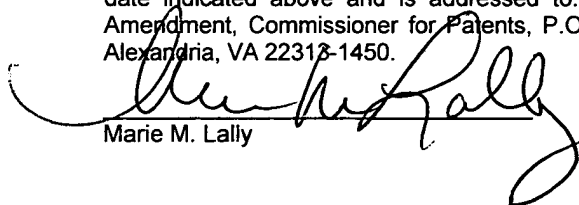
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